THE REMARKS

Claims 1-4, 20-22, 39-41 and 43 are pending, and claims 5-19, and 23-38 are withdrawn. Claim 42 is canceled. Claims 1, 3, 20, 21, 39, and 41 are amended herein.

The Amendments

Independent claims 1, 3, 20, 21 and 41 have been amended. Dependent claim 39 has also been amended. Support for these amendments is found in the Applicant's Specification as follows:

Claims 1, 3, 20, 21 and 41 - pg.12, ln 19-24; pg. 14, ln 10-20; pg. 21, ln. 9-17, pg. 28, ln 19-21; pg. 39, ln 14-20; Fig. 14B

Claim 39 – pg. 16, ln 16-30; pg. 39, ln 20-21.

No new matter is introduced in any of the above amendments. The Examiner is requested to enter the amendment and re-consider the application.

The Applicant thanks the Examiner for the Examiner Interview conducted on February 13, 2009. Per that Interview, the Applicant has incorporated the element that non-content-enabled service is supported on OSI layer 4, and content-enabled service is supported on OSI layers 5-7.

35 U.S.C. §103(a) Rejections

Claims 1-4, 20-22 and 40-41 are rejected under 35 U.S.C. §103(a) over U.S. Patent No. 6,981,029 to Menditto, et al. in view of U.S. Patent Application No. 2003/0023744 to Sadot, et al.

Independent Claim 1

In response to the rejection, the Applicant has amended claim 1 to incorporate the following limitations:

> "the first logic configured so that:

when a service request for a content-enabled service, comprising a request for a connection to a server at a layer corresponding to any of OSI layers 5-7, is received, the first logic determines if the at least one first persistence policy is applicable;

when a service request for a non-content-enabled service, comprising a request for a connection to a server at a layer corresponding to OSI layer 4, is received, the first logic determines if the at least one second persistence policy is applicable;"

and

"wherein, when the service request for a content-enabled service is bound to a server identified through application of a load balancing policy, such request is bound to the server only after multiple persistence policies are checked for applicability."

This amendment is supported in the Applicant's Specification, pg.12, ln 19-24, pg. 14, ln 10-20; pg. 21, ln 9-17; pg. 28, ln 19-21; page 39, ln 14-20; Fig. 14B. The amendment is non-obvious over Menditto, in view of Sadot for the following reasons:

Neither Menditto nor Sadot teach a system that specifies the required correspondence between OSI layers and content-enabled and non-content-enabled service requests.

The Applicant's Specification discloses a correspondence between OSI layer 4 and non-content-enabled service requests, and OSI layers 5-7 and content-enabled service requests:

"For level 4 service (i.e., non content-enabled service), these values are used directly in the proxy server manager 36 for implementation of policy considerations. For level 5 to level 7 service (i.e., content-enabled service) these initial values are may be qualified inside the proxy server manager 36 according to content and history based rules for implementing certain content-based and persistence policies." (pg. 12, ln 19-24)

Relative to Menditto, Menditto makes a few references to OSI layers, for example,

"Routing technology has evolved from simple L3 routing based on destination Internet Protocol (IP) address to L4/L5 routing based on source/destination IP addresses, port numbers, and protocol type." (col 1, lines 14-17).

"The quality of service component of content gateway 18 leverages L2/L3 quality of service features to provide differentiated service to qualified HTTP requests." (col 14, ln 41-44).

"Content gateway processor 30 is the processing system that generally executes content routing L7 functions." (col 5, ln 61-62)

However, these citations do not teach or suggest the limitations of the aforementioned amendment. Further, Mendito describes content services as services provided to users who have "subscribed" to such services. For example,

> "Connections for a request that are not for subscribed content providers **14** are not terminated at content gateway 18, and therefore, are not subject to any content routing overhead. Connections for requests sent to subscribed content providers **14** are terminated at content gateway 18 so that the request content may be classified." (col. 5, ln 16-21)

Relative to Sadot, Sadot does reference the applications layer,

> "Optionally, the session ID values comprise application layer ID values." (para [0019])

However, Sadot offers no discussion on the correspondence between OSI layers and content-enabled and non-content-enabled service requests.

Neither Menditto nor Sadot teach a system where, when the service request for a content-enabled service is bound to a server identified through application of a load balancing policy, such request is bound to the server only after multiple persistence policies are checked for applicability.

In the following passages, the Applicant's Specification describes an embodiment where a service request for a content-enabled service is bound to a server identified through application of a load balancing policy only after multiple persistence policies (session ID or cookie ID persistence policy followed by client ID persistence policy) are checked for applicability:

> the client IP address as the key. When another request for service is received by the same client, a session ID or cookie ID may be associated with the request. The policy engine will first examine history table **98** for entries corresponding to the received session ID or cookie ID. Failing to find a valid entry, the policy engine will next examine history table **98** for an entry corresponding to received client IP address. The policy engine will find a valid entry including a server ID, and will allocate that server to the request. The policy engine will also hash the session ID and/or the cookie ID

(Page 39, lines 14-20).

> If a persistence policy is not applicable, then a load balancing policy is employed. Persistence attempts to force the client request to the server that handled the last request from the same client. Stickiness for an L4 request is based on the client identity. For an L5-7 request, cookie-based or session-based stickiness is attempted. System administrators may attach server identifiers in their cookies. Therefore, implementation of cookie-based stickiness may first be attempted based on any server identifier embedded in a cookie. However, if a server identifier is not found in the cookie, then an attempt may be made to apply a stickiness policy based on hashing of other information in the cookie.

(Page 21, lines 9-17).

Neither Meditto nor Sadot teach or describe this requirement. The following paragraph of Sadot does not even relate to a content-enabled service request. The paragraph refers to a SSL "client hello" message that lacks a SSL session ID, which is a non-content-enabled message in this particular example. Nor does this paragraph teach or suggest checking multiple persistence policies for applicability before applying a load balancing policy.

> [0035] If (208) the packet does not comprise an SSL "client hello" message which includes an SSL session ID, the packet is handled (210) according to load balancing methods known in the art,.... (Sadot, para.[0035])

Therefore, this requirement of amended claim 1 is not described by Menditto or Sadot, considered singly or in combination. The Applicant respectfully asserts that amended claim 1 is non-obvious over Menditto in view of Sadot.

Independent Claims 3, 20, 21, 41.

Claims 3, 20, 21 and 41 have been amended in a manner similar to claim 1. According, the Applicant respectively asserts that amended claims 3, 20, 21 and 41 are also non-obvious over Menditto in view of Sadot.

Dependent Claims 2, 4, 22, 40

Claims 2, 4, 22 and 40 are directly dependent on amended claims 1, 3, and 20. The Applicant respectfully asserts that claims 2, 4, 22 and 40 are allowable at least based on an allowable base claim.

Claim 39 is rejected under 35 U.S.C. 103(a) over U.S. Patent No. 6,981,029 to Menditto, et al. in view of U.S. Patent Application No. 2003/0023744 to Sadot, et al. as applied to claim 1 above, and further in view of U.S. Patent No. 6,351,812 to Datar, et al.

Dependent Claim 39

Claim 39 is directly dependent on claim 1. The Applicant respectfully asserts that claim 39 is allowable at least based on an allowable base claim.

However, in addition, dependent claim 39 has been amended as follows:

> "The system of claim 1 wherein the at least one first persistence policy comprises ~~at least~~ one or more of a cookie~~-based~~ hashing stickiness persistence policy, a session-ID hashing stickiness persistence policy, and a self-identification stickiness persistence policy, and the at least one second persistence policy comprises at least one client-based persistence policy."

Support for this amendment is in the Applicant's Specification, at pg. 16, ln 16-30, and pg. 39, ln. 20-21. Neither Menditto nor Sadot nor Datar teach a cookie hashing stickiness persistence policy, a session-ID hashing stickiness persistence policy, or a self-identification stickiness persistence policy. Therefore, claim 39 as amended is neither described nor suggested by Menditto, Sadot or Datar, considered singly or in combination. Therefore, Applicant respectfully submits that amended claim 39 is non-obvious over Menditto, in view of Sadot, in view of Datar.

Claim 43 is rejected under 35 U.S.C. 103(a) over U.S. Patent No. 6,981,029 to Menditto, et al. in view of U.S. Patent Application No. 2003/0023744 to Sadot, et al. as applied to claim 1 above in view of U.S. Patent Application No. 2002/0199014 to Yang, et al.

Dependent Claim 43

Claim 43 is directly dependent on amended claim 1. The Applicant respectfully asserts that claim 43 is allowable at least based on an allowable base claim.

CONCLUSION

Applicants believe that the application is now in good and proper condition for allowance. Early notification of allowance is earnestly solicited.

Respectfully submitted,

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